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<b>Subject:</b>	THERAPEUTIC DRUG LEVELS				
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## THERAPEUTIC DRUG LEVELS

Blood level determination can be made on the following drugs to assist the physician in adjusting dosages to achieve and maintain therapeutic levels and prevent toxicity. They may also be helpful in providing information required for treatment of certain drug overdoses. A listing of the drugs by chemical and trade names, and any special instructions related to time intervals for obtaining specimens is found below.

DRUG	TRADE NAME	SPECIAL INSTRUCTIONS
Acetaminophen	Tylenol	Blood drawn 4 hours after ingestion.
Amikacin	Amikin	High dosages of penicillins and/or cephalosporins are known to inactivate amikacin in vitro.
Anti-Convulsants Carbamazepine	Tegretol	Concurrent administration of Phenytoin or a Phenobarbital may reduce half-life 9-10 hours. Administration of erythromycin, other macrolides, and propoxyphen can increase carbamazepine levels.
Phenobarbital	Luminal	-----
Phenytoin	Dilantin	Specimens with elevated total protein > 9.0 g/dl may give a positive bias greater than 2.3 ug/ml.

Digoxin	Lanoxin	Specimens should be drawn at least 6 hours after oral dose and 4 hours after intravenous dose. Digoxin Immune FAB (Digibind) therapy interfere with Digoxin measurements.
Gentamicin	Garamycin	High dosages of penicillins and/or cephalosporins are known to inactivate gentamicin in vitro.
Lidocaine	Xylocaine	-----
Theophylline	Aminophylline	-----
Tobramycin	-----	High dosages of penicillins and/or cephalosporins are known to inactivate tobramycin in vitro. Samples containing amikacin, dibekacin, kanamycin A & B, or neomycin will yield falsely elevated values.
Vancomycin	Vancocine	Doses $\leq$ 1 gram should be infused over 1 hour. Doses $\geq$ 1 gram should be infused over 90 minutes. The 2 gram doses are infused over 2 hours.